From: "Coffey, Scott" < CoffeySE@cdmsmith.com>

To: "Zhen, Davis" <Zhen.Davis@epa.gov>

"Sheldrake, Sean" <sheldrake.sean@epa.gov>

CC: younghs@cdmsmith.com

"Trump, Julee M." <trumpjm@cdmsmith.com>
"Greazel, Andrew" <GreazelAD@cdmsmith.com>

Date: 4/18/2018 5:57:58 PM

Subject: FW: Revised HV Control SOP ready for submittal to EPA

Hi Davis and Sean.

We've reviewed the updated SOP on control points for the sediment survey and feel it generally has updated the information describing their new survey control point approach with some minor items that need buttoning up which we list in bullets below within a draft email statement to deliver to Ken.

Ken,

EPA has completed review of the Revised HV Control SOP and request the following information and changes to the Horizontal and Vertical Control SOP prior to final approval.

- Please provide for EPA's review Attachment 1, that contains a detailed survey sheet for the new control point PH2.
- Correct Figure 2 so that it indicates that Pile 1 is PH-2.
- We understand from recent field crew discussions that vessel GPS coordinates have been consistently verified and as a result they are discontinuing the QA/QC backup position checks with the handheld GPS. This contradicts the current text of the SOP and the emailed response provided on 4/16 (extracted and pasted below). Please revise the SOP to match exactly what the field crew intends to do to avoid confusion and issues.
- 4-16-18 emailed response from AECOM regarding handheld GPS position checks:

Additionally, we understand from field staff that the handheld position check is performed at the lab/warehouse at the intersection of two cracks.

- This appears to be a deviation from the FSP, and a description of the deviation needs to be provided to EPA for approval.
- Can you provide additional details on the establishment of this check point?

The position check described above should be performed at PH1 or PH2 (if Change Request 2 is approved); this will be clarified to the field crews. This check is performed with a different GPS system comprised of a Trimble R1 and mobile phone based collector application. It is a redundant QA/QC measure and is referenced so in Appendix B-1 of FSP (Survey Control). This data is not being retained in the project database specifically unless there is a failure of the vessel navigation system. It will be retained in electronic file format and stored on project servers. Accordingly, a Change Request does not seem necessary at this time however if EPA prefers this we can prepare one.

Davis.

From: Zhen, Davis <Zhen.Davis@epa.gov> Sent: Tuesday, April 17, 2018 7:38 AM To: Tyrrell, Ken <ken.tyrrell@aecom.com>

Cc: Coffey, Scott <CoffeySE@cdmsmith.com>; Young, Howard S. <younghs@cdmsmith.com>; Trump, Julee M.

<trumpjm@cdmsmith.com>

Subject: RE: Revised HV Control SOP ready for submittal to EPA

Thank you Ken.

My email also serves as a conditional approval for Pre-RD/AECOM to commence CERCLA sediment sampling activities in the PHSS while EPA determines the adequacy of the revise SOP.
See you shortly.
Thanks,

Davis Zhen, Manager Site Cleanup Unit 2 Office of Environmental Cleanup 1200 Sixth Avenue Suite 155 M/S ECL 122, Seattle, WA 98101 Tel: (206) 553-7660 Cell: (206) 437-5826
From: Tyrrell, Ken [mailto:ken.tyrrell@aecom.com] Sent: Tuesday, April 17, 2018 7:12 AM To: Zhen, Davis <zhen.davis@epa.gov> Cc: Scott Coffey <coffeyse@cdmsmith.com>; younghs@cdmsmith.com Subject: Fwd: Revised HV Control SOP ready for submittal to EPA</coffeyse@cdmsmith.com></zhen.davis@epa.gov>
Davis,
See attached.
Sent from my iPhone
Begin forwarded message:
From: "Kline, Danni" <danni.kline@aecom.com> Date: April 17, 2018 at 7:03:44 AM PDT To: "Tyrrell, Ken" <ken.tyrrell@aecom.com> Cc: Keith Kroeger <kkroeger@geosyntec.com>, "Kindberg, Cary" <cary.kindberg@aecom.com>, "Surowiec, Mike" <mike.surowiec@aecom.com>, Anne Fitzpatrick <afitzpatrick@geosyntec.com> Subject: Revised HV Control SOP ready for submittal to EPA</afitzpatrick@geosyntec.com></mike.surowiec@aecom.com></cary.kindberg@aecom.com></kkroeger@geosyntec.com></ken.tyrrell@aecom.com></danni.kline@aecom.com>
Ken, Please see attached RLSO and Clean versions of the revised HV Control SOP.

Thanks, Danni